

WHAT IS CLAIMED IS:

1. A method for routing calls of an automatic call distributor system, comprising:

receiving, from a user, a request for connection  
5 with one of a plurality of agents having one of a plurality of skills;

identifying at least first and second agents of the plurality of agents, the first and second agents each having at least the one of the plurality of skills;

10 the first and second agents being available for connection with the user along first and second communication paths, respectively;

receiving network information regarding each of the first and second communication paths;

15 identifying a generally unique skill of the plurality of skills; and

routing the request along a preferred communication path of the first and second communication paths, the preferred communication path being selected to attain a  
20 higher probability that the generally unique skill will remain available for receiving a future request for connection.

2. The method of Claim 1, wherein the network  
25 information regarding each of the first and second communication paths, respectively, comprises first and second quantities of bandwidth available along the first and second communication paths, respectively.

30 3. The method of Claim 1, wherein the plurality of skills comprise a plurality of languages spoken by one or more of the plurality of agents.

4. The method of Claim 1, wherein the plurality of skills comprise a plurality of business types addressed by one or more of the plurality of agents.

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5. The method of Claim 1, wherein the first agent is geographically remote from the second agent, and a third agent having the generally unique skill is co-located with one of the first and second agents.

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6. The method of Claim 1, wherein the network information regarding each of the first and second communication paths, respectively, includes network parameters associated with the first and second communication paths, respectively, the network parameters being selected from the group consisting of delay, jitter, and echo.

7. A method for handling calls of an automatic call distributor system, comprising:

receiving, from a user, a request for connection with one or a plurality of agents, having one of a plurality of skills;

connecting the user with a preferred agent of the plurality of agents, the preferred agent having the one of the plurality of skills; and

wherein the preferred agent is selected according to a statistical analysis using variables including a network resource available along a communication path between the user and the preferred agent, and an impact of connecting the user with the preferred agent upon the availability of a generally unique skill of the plurality of skills, to a future user.

8. The method of Claim 7, wherein the network resource comprises bandwidth.

9. The method of Claim 7, wherein the network resource comprises voice quality.

10. The method of Claim 8, wherein the statistical analysis further includes voice quality available along the communication path.

11. An automatic call distributor system, comprising:

at least one input port operable to receive, from a user, a request for connection with one of a plurality of  
5 agents having one of a plurality of skills;

a processor being operable to identify at least first and second agents of the plurality of agents, the first and second agents each having at least the one of the plurality of skills;

10 the first and second agents being available with the user for connection along first and second communication paths, respectively;

the processor being further operable to receive network information regarding each of the first and  
15 second communication paths, and identify a generally unique skill of the plurality of skills; and

the processor being further operable to select a preferred communication path of the first and second communication paths, for routing the request, the  
20 preferred communication path being selected to attain a higher probability that the generally unique skill will remain available to future users.

12. The system of Claim 11, wherein the network  
25 information regarding each of the first and second paths, respectively, comprises first and second quantities of bandwidth available along the first and second communication paths, respectively.

30 13. The system of Claim 11, wherein the plurality of skills comprise a plurality of languages spoken by one or more of the plurality of agents.

14. The system of Claim 11, wherein the plurality of skills comprise a plurality of business types addressed by one or more of the plurality of agents.

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15. The system of Claim 11, wherein the first agent is geographically remote from the second agent, and a third agent having the generally unique skill is co-located with one of the first and second agents.

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16. The system of Claim 11, wherein the network information regarding each of the first and second network communication paths, respectively, includes network parameters associated with the first and second communication paths, respectively, the network parameters being selected from the group consisting of delay, jitter, and echo.

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17. An automatic call distributor system, comprising:

at least one input port being operable to receive, from a user, a request for connection with one of a plurality of agents having one of a plurality of skills;

a processor being operable to identify a preferred agent of the plurality of agents, the preferred agent having the one of the plurality of skills; and

wherein the processor is operable to select the preferred agent by a statistical analysis using a plurality of variable values including a network resource available along a communication path between the user and the preferred agent, and an impact of connecting the user with the preferred agent upon the availability of a generally unique skill of the plurality of skills, to a future user.

18. The system of Claim 17, wherein the network resource comprises bandwidth.

19. The system of Claim 17, wherein the network resource comprises voice quality.

20. The system of Claim 18, wherein the statistical analysis further includes voice quality available along the communication path.

21. The system of Claim 20, wherein voice quality is determined using one of a plurality of parameters including jitter, delay, and echo.

22. Logic encoded in media for routing calls of an automatic call distributor system, the logic operable to perform the following steps:

5 receive, from a user, a request for a connection with one of a plurality of agents having one of a plurality of skills;

identify at least first and second agents of the plurality of agents, the first and second agents each having at least the one of the plurality of skills;

10 the first and second agents being available to receive the request for connection along first and second communication paths, respectively;

receive network information regarding each of the first and second communication paths;

15 identify a generally unique skill of the plurality of skills; and

route the request along a preferred communication path of the first and second communication paths, the preferred communication path being selected to attain a  
20 higher probability that the generally unique skill will remain available for receiving a future request for connection.

23. The logic encoded in media of Claim 22, wherein  
25 the network information regarding each of the first and second communication paths, respectively, comprises first and second quantities of bandwidth available along the first and second communication paths, respectively.

30 24. The logic encoded in media of Claim 22, wherein the plurality of skills comprise a plurality of languages spoken by one or more of the plurality of agents.

25. The logic encoded in media of Claim 22, wherein the plurality of skills comprise a plurality of business types addressed by one or more of the plurality of  
5 agents.

26. The logic encoded in media of Claim 22, wherein the first agent is geographically remote from the second agent, and a third agent having the generally unique  
10 skill is co-located with one of the first and second agents.

27. The logic encoded in media of Claim 22, wherein the network information regarding each of the first and  
15 second communication paths, respectively, includes network parameters associated with the first and second communication paths, respectively, the network parameters being selected from the group consisting of delay, jitter, and echo.

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28. Logic encoded in media for handling calls of an automatic call distributor system, the logic operable to perform the following steps:

receive, from a user, a request for connection with  
5 one of a plurality of agents, having one of a plurality of skills;

select a preferred agent of the plurality of agents by a statistical analysis using variables including a network resource available along a communication path  
10 between the user and the preferred agent, and an impact of connecting the user with the preferred agent upon the availability of a generally unique skill of the plurality of skills to a future user; and

connect the user with the preferred agent, the  
15 preferred agent having the one of the plurality of skills.

29. The logic encoded in media of Claim 28, wherein the network resource comprises bandwidth.

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30. The logic encoded in media of Claim 28, wherein the network resource comprises voice quality.

31. The logic encoded in media of Claim 29, wherein  
25 the statistical analysis further includes voice quality available along the communication path.

32. An apparatus for routing calls of an automatic call distributor system, comprising:

means for receiving, from a user, a request for connection with one of a plurality of agents having one  
5 of a plurality of skills;

means for identifying at least first and second agents of the plurality of agents, the first and second agents each having at least one of the plurality of skills;

10 the first and second agents being available to receive the request for connection along first and second communication paths, respectively;

means for receiving network information regarding each of the first and second communication paths;

15 means for identifying a generally unique skill of the plurality of skills; and

means for routing the request along a preferred communication path of the first and second communication paths, the preferred communication path being selected to  
20 attain a higher probability that the generally unique skill will remain available for receiving a future request for connection.

33. The apparatus of Claim 32, wherein the network  
25 information regarding each of the first and second communication paths, respectively, comprises first and second quantities of bandwidth available along the first and second communication paths, respectively.

30 34. The apparatus of Claim 32, wherein the plurality of skills comprise a plurality of languages spoken by one or more of the plurality of agents.

35. The apparatus of Claim 32, wherein the plurality of skills comprise a plurality of business types addressed by one or more of the plurality of agents.

36. The apparatus of Claim 32, wherein the first agent is geographically remote from the second agent, and a third agent having the generally unique skill is co-located with one of the first and second agents.

37. The apparatus of Claim 32, wherein the network information regarding each of the first and second communication paths, respectively, includes network parameters associated with the first and second communication paths, respectively, the network parameters being selected from the group consisting of delay, jitter, and echo.

38. An apparatus for handling calls of an automatic call distributor system, comprising:

means for receiving, from a user, a request for a connection with one of a plurality of agents having one  
5 of a plurality of skills;

means for selecting a preferred agent of the plurality of agents by a statistical analysis using variables including a network resource available along a communication path between the user and the preferred  
10 agent, and an impact of connecting the user with the preferred agent upon the availability of a generally unique skill of the plurality of skills, to a future user; and

means for connecting the user with the preferred  
15 agent, the preferred agent having the one of the plurality of skills.

39. The apparatus of Claim 38, wherein the network resource comprises bandwidth.

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40. The apparatus of Claim 38, wherein the network resource comprises voice quality.

41. The apparatus of Claim 39, wherein the  
25 statistical analysis further includes voice quality available along the communication path.